**NOTES 816200**

***MAVEN***

!?!What is Maven and why is it used?

--Maven is a build automation tool used primarily for Java projects.

Maven dynamically downloads Java libraries and Maven plug-ins from

one or more repositories such as the Maven 2 Central Repository,

and stores them in a local cache.

!?!How to create a Maven Project?

--In Eclipse, follow these steps to create a project using the Lagom Maven archetype:

1. From the File menu, select New > Project.

The New Project screen opens.

2. Expand Maven, select Maven Project, and click Next.

The New Maven project wizard opens.

3. Leave the default, Use default Workspace location box selected and click Next.

The Select an archetype page opens.

4. If the Lagom archetype appears in the list, select it. If not,

click Add Archetype and supply the following values:

\*Archetype Group Id: com.lightbend.lagom

\*Archetype Artifact Id: maven-archetype-lagom-java

\*Version: The Lagom version number. Be sure to use the current stable release.

\*Repository URL: Leave blank

5. Click OK.

The next page of the wizard opens, providing fields to identify the project

and displaying the hello and stream properties from the archetype.

6. To identify your project, enter the following:

\*Group Id - Usually a reversed domain name, such as com.example.hello.

\*Artifact Id - Maven also uses this value as the name for the top-level project folder.

You might want to use a value such as my-first-system.

\*Version - A version number for your project.

\*Package - By default, the same as the groupId.

7. Click Finish and the projects created by the archetype display in the Package Explorer.

8. Run the project.

!?!What are the commands of the Maven and it's purposes?

--"mvn --version" = Prints out the version of Maven you are running.

"mvn clean" = Clears the target directory into which Maven normally builds your project.

"mvn install" = Builds the project described by your Maven POM file and installs the resulting artifact (JAR) into your local Maven repository.

"mvn install -DskipTests” = Builds the project described by your Maven POM file without running unit tests, and installs the resulting artifact (JAR) into your local Maven repository.

!?!What is a Maven LifeCycle?

--Maven is based around the central concept of a build lifecycle.

There are three built-in build lifecycles:: default (Sometimes called build), clean and site.

The default lifecycle handles your project deployment, the clean lifecycle handles project cleaning,

while the site lifecycle handles the creation of your project's web site.